

## **REMARKS**

Claims 1-76 are pending in the application. Claims 1-59 stand rejected. Claims 50 and 55 have been amended. In view of the following, all remaining claims are in condition for allowance.

### **Objection to the Drawings**

As illustrated in the replacement sheet submitted herewith, the drawings have been corrected according to the Examiner's suggestion. As such, the Examiner is respectfully requested to withdraw this objection.

### **Rejection Of Claims 50 and 55 Under 35 U.S.C. § 112, Second Paragraph**

Claims 50 and 55 have been amended. As such, the Examiner is respectfully requested to withdraw this rejection.

### **Rejection Of Claims 1-2, 4, 6-12, 14-23, 25-34, 36-41, 44-51, 53-55 and 57-58 Under 35 U.S.C. § 102(b) As Being Anticipated By Anderson**

#### **Claim 1**

Claim 1 recites a beam combiner comprising a first beam input face aligned to receive first and second beams of electromagnetic energy, a beam output face, a first reflector aligned to reflect the first received beam toward the beam output face, and a second reflector aligned to pass the first beam from the first reflector and to reflect the received second beam toward the beam output face.

For example, referring, e.g., to FIG. 3 and paragraph 27-30 of the present application, a beam combiner 300 for combining separate R, G, and B light beams 104, 106, and 108 into a single, composite light beam 302 includes three sections 306, 308, and 310, which are bonded together and which are made from a transparent material such as glass or polymer suitable for optical applications. The combiner 300 also includes an input face 312 and an output face 314. The first section 306 includes a

reflector face 318 for reflecting the R beam 104 toward a combiner output face 314. The second section 308 includes a reflector face 322, which lies along an interface between the sections 306 and 308 and passes the reflected R beam 104 and reflects the G beam 106 toward the combiner output face 314.

In contrast, Anderson fails to teach the limitations recited in claim 1. For example, referring, e.g., to FIG. 3, column 3, lines 57-63 and column 5, lines 44-56 of Anderson, a cascaded illumination system 30 has multiple TIR prisms 33. Each TIR prism 33 receives light from an associated light source 31. An internal surface of the TIR prisms 33 reflects the light to an exit condenser lens 35. The TIR prisms 33 are in series, such that light from a source 31 must pass through any TIR prism 33 associated with a source 31 that is closer to a digital micro-mirror device 36. The internal reflective surfaces of the TIR prisms 33 are oriented relative to the other surfaces so that the beams of light from the sources 31 follow adjacent parallel paths or the paths may overlap partly or completely. Each TIR prism 33 is a beam splitting device comprised of two triangular prisms having their angled surfaces in close proximity to each other. An internal surface of a first prism reflects light out, and an air gap between the two prisms is sufficiently small that light may be transmitted through both prisms. Because of these gaps, the teachings of Anderson require more than one beam input face to receive first and second beams to be respectively reflected by first and second reflectors. Accordingly, in no manner does Anderson teach or suggest a beam combiner that includes a beam input face aligned to receive first and second beams, a beam output face, a first reflector aligned to reflect the first received beam toward the beam output face, and a second reflector aligned to pass the first beam from the first reflector and to reflect the received second beam toward the beam output face.

#### **Claim 50**

Claims 34, 41, 45, 49 and 50 are patentable for reasons similar to those discussed above in support of the patentability of claim 1.

**Claims 2, 4, 6-11, 36-40, 44, 46-48, 51 and 53-54**

Claims 2, 4, 6-11, 36-40, 44, 46-48, 51 and 53-54 are patentable by virtue of their respective dependencies from claims 1, 34, 41, 45, 49 and 50.

**Claim 12**

Claim 12 recites a first section of transparent material, a second section of transparent material operable to reflect a second wavelength and to pass a first wavelength of electromagnetic radiation, and a third section of transparent material operable to reflect a third wavelength of electromagnetic radiation and to pass the first and second wavelengths.

For example, as discussed above, the present application discloses a beam combiner 300 for combining separate R, G, and B light beams 104, 106, and 108 into a single, composite light beam 302.

In contrast, Anderson fails to teach the limitations recited in claim 12. Referring, *e.g.*, to column 5, lines 52-56 of Anderson, “[o]ne application of system 30 might be to have differently colored sources 31. The differently colored source light beams could be directed by TIR prisms 33 on separate but adjacent paths, or they could be merged.” The Applicants’ attorney respectfully submits that “differently-colored” beams can be interpreted as beams of no more than two different colors (wavelengths). As such, while Anderson does suggest that the sources 31 could provide, and the prisms 33 direct, beams of two different wavelengths, Anderson fails to teach or suggest that the sources could provide, and the prisms direct, radiation having three different wavelengths as is required by claim 12.

**Claims 23, 34, 41, 45, 49 and 55**

Claims 23, 34, 41, 45, 49 and 55 are patentable for reasons similar to those discussed above in support of the patentability of claim 12.

**Claims 14-22, 25-33, 36-40, 44, 46-48 and 57-58**

Claims 14-22, 25-33, 36-40, 44, 46-48 and 57-58 are patentable by virtue of their respective dependencies from claims 12, 23, 34, 41, 45 and 55.

**Rejection Of Claims 3, 5, 13, 24, 35, 42, 43, 52, 56 and 59 Under 35 U.S.C. § 103(a)**

**As Being Unpatentable Over Anderson**

Claims 3, 5, 13, 24, 35, 42, 43, 52, 56 and 59 are patentable by virtue of their respective dependencies from claims 1, 12, 23, 34, 41, 50 and 55.

**CONCLUSION**


In view of the foregoing, all claims remaining in the application are in condition for allowance. The issuance of a formal Notice of Allowance at an early date is respectfully requested.

If the Examiner believes that a telephone conference would expedite prosecution of this application, please telephone the undersigned at 425.455.5575. **The Examiner is respectfully requested to telephone the undersigned to discuss this paper prior to issuing a rejection of the claims in response thereto.**

In the event additional fees are due as a result of this amendment, you are hereby authorized to charge such payment to Deposit Account No. 07-1897.

Respectfully submitted,

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